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T:D

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. |
|-----------------|-------------|----------------------|---------------------|
| 09/839,762      | 04/20/01    | LUCARELLI            | M 96135CON2         |

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IM22/1107

 EXAMINER

RAJGURU, U

| ART UNIT | PAPER NUMBER |
|----------|--------------|
| 1711     |              |

DATE MAILED: 11/07/01

4

Please find below and/or attached an Office communication concerning this application or proceeding.

**Commissioner of Patents and Trademarks**

|                              |                 |                |  |
|------------------------------|-----------------|----------------|--|
| <b>Office Action Summary</b> | Application No. | Applicant(s)   |  |
|                              | Examiner        | Group Art Unit |  |

—The MAILING DATE of this communication appears on the cover sheet beneath the correspondence address—

#### Period for Response

A SHORTENED STATUTORY PERIOD FOR RESPONSE IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a response be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for response specified above is less than thirty (30) days, a response within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for response is specified above, such period shall, by default, expire SIX (6) MONTHS from the mailing date of this communication .
- Failure to respond within the set or extended period for response will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).

#### Status

- Responsive to communication(s) filed on \_\_\_\_\_.
- This action is FINAL.
- Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

#### Disposition of Claims

- Claim(s) 1-23 is/are pending in the application.
- Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- Claim(s) \_\_\_\_\_ is/are allowed.
- Claim(s) 1-23 is/are rejected.
- Claim(s) \_\_\_\_\_ is/are objected to.
- Claim(s) \_\_\_\_\_ are subject to restriction or election requirement.

#### Application Papers

- See the attached Notice of Draftsperson's Patent Drawing Review, PTO-948.
- The proposed drawing correction, filed on \_\_\_\_\_ is  approved  disapproved.
- The drawing(s) filed on \_\_\_\_\_ is/are objected to by the Examiner.
- The specification is objected to by the Examiner.
- The oath or declaration is objected to by the Examiner.

#### Priority under 35 U.S.C. § 119 (a)-(d)

- Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d).
  - All  Some\*  None of the CERTIFIED copies of the priority documents have been received.
  - received in Application No. (Series Code/Serial Number) \_\_\_\_\_.
  - received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

\*Certified copies not received: \_\_\_\_\_.

#### Attachment(s)

|  |   |
|--|---|
| <input type="checkbox"/> Information Disclosure Statement(s), PTO-1449, Paper No(s). _____ | <input type="checkbox"/> Interview Summary, PTO-413                     |
| <input type="checkbox"/> Notice of References Cited, PTO-892                               | <input type="checkbox"/> Notice of Informal Patent Application, PTO-152 |
| <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review, PTO-948           | <input type="checkbox"/> Other _____                                    |

#### Office Action Summary

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1. Claims 1-23 are under examination. Claims 1, 12, 14 and 23 are amended.
2. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 1, 12, 14 and 23 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

These claims now encompass "a metal oxide wherein the metal oxide has been size-reduced to a mean agglomerate particle size ...". There is no support in the specification for this limitation.

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claim 8 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The term "light" (line 2); in claim 8 is a relative term which renders the claim indefinite. — withdrawn  
The term "light" is not defined by the claim, the specification does not provide a standard for

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ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention. It is not known which specified hydrocarbons are envisioned as modifying agents in this claim.

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CAR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(f) or (g) prior art under 35 U.S.C. 103(a).

6. Claims 1-23 are rejected under 35 U.S.C. 103(a) as begin unpatentable over GB 2311527 in view of GB 2296915 (both references are of record on PTO-1449, paper nos. 5 and 4 resp. In parent case Ser. No. 09/232310).

GB '527 discloses powder coating composition comprising particles of thermosetting

*WKF* resin and 0.05 to 2.0 parts by wt per 100 parts by wt of said resin, of finely divided hydrophobic

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silica powder having a number av. particle size of 3 to 10 nm (p. 2, lines 15-23). Titanium dioxide, iron oxide are two other metal oxides suitable for incorporation into this composition (p. 5, line 3). Silica powder has been surface treated (p. 2, line 24 to p. 3 line 2; p. 6, line 21 to p. 7 line 6). Since the disclosed particle size of silica is 3 to 10 nm, it is reasonable to conclude that

*(M&R)* the said silica is a ~~fumed~~ <sup>fumed</sup> silica.

*(M&R)* GB '527 does not disclose (claimed) hexamethyldisilazane as the ~~hydrophobia~~ <sup>hydrophobing</sup> agent for treatment of metal oxide (instant claim 12).

GB 2296915 discloses surface - modified pyrogenically produced mixed oxides comprising SiO<sub>2</sub> and modified with one or more compounds that are listed in the abstract. One such class of compounds is silazanes (p. 4, lines 11-15). In the process it is seen (p. 6, ~~lines~~ <sup>lines</sup> 4-24) that water and ammonia are likely to be produced and that a part of ammonia remains attached to the metal oxide at its surface.

Therefore it would have been obvious to use the silazanes of GB '915 as the modifying agent of choice in the composition of GB '527 with the expectation of achieving better flow and *(M&R)* (thereby) coating having better performance.

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

8. Claims 1-11 are rejected under 35 U.S.C. 102(b) as being anticipated by GB 2311527.

*With drawn  
07.25.02*

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Disclosure of GB '527, which is summarized above, provides that the above claims lack novelty.

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to U.K. Rajguru whose telephone number is (703) 308-3224. The examiner can normally be reached on Monday - Friday from 9:30 am to 6:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, James J. Seidleck, can be reached on (703) 308-2462. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9310/9311.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308-0661.

U.K. Rajguru/om  
November 3, 2001